

08/154126
11/330404

13 Recd PCT/PTO 14 SEP 1992

- 1 -

JM3
4/8/93

~~S P E C I F I C A T I O N~~

A P R E S S U R E W A V E F O R M S E T T I N G M E T H O D F O R I N J E C T I O N

~~P R E S S U R E C O N T R O L A N D A N I N J E C T I O N M O L D I N G M A C H I N E~~

~~a B a c k g r o u n d o f t h e I n v e n t o r ' s T e c h n i c a l F i e l d~~

5 The present invention relates to an injection molding machine capable of providing feedback control of an injection pressure for making it equal to a target injection pressure in the injection and dwell stages, more particularly, to a method for setting waveform of an injection pressure to be used in setting a target value and an injection molding machine for carrying out this method.

10

~~a 2. Description of the Related Art~~

15 Generally, according to a conventional injection molding machine, the injection speed is set in accordance with the advanced position of a screw, and the advancing speed of the screw is controlled to be made equal to the set injection speed, in an injection stage. In a dwell stage, the machine is controlled so that a set dwell pressure is applied to a resin.

20

25 In actual molding operation, however, the propriety of the injection pressure influences the conformity of molded articles much more greatly than that of the injection speed. It is desirable, therefore, that the injection pressure should be feedback-controlled during the injection and dwell stages. The inventor hereof proposed a control system in which a pressure sensor is mounted on a screw shaft, and the dwell pressure is feedback-controlled by detecting a pressure of the resin acting on the screw shaft. This is disclosed in Published Unexamined Japanese Patent Application No. 62-218118. However,

30